

# ANTÓNIO M. MENDES

## SKILLS & COMPETENCES

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Post doctoral fellow with technical experience in a wide variety of methods and concepts related to molecular biology, genetics, entomology, microbiology and parasitology. All training has been with an emphasis on applied science related to public health.

- Significant experience in operational research, including knowledge of and experience in qualitative research methods for malaria surveillance, diagnostic and treatment.
- Strong knowledge of malaria transmission systems and entomology, including methods for insect control/rearing/infection/dissection and parasite culture.
- Extensive training in microarrays, RNA and DNA methods, RNAi and cell culture.
- Strong background in bioinformatics and biostatistics methods.
- Proven skills in technical and non-technical writing.
- Excellent interpersonal and consultative skills, including the ability to communicate, present, negotiate and influence a variety of audiences

## RESEARCH EXPERIENCE

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2011 – Present

***Postdoctoral fellow***

Instituto de Medicina Molecular, Lisbon, Portugal  
Unidade de Malaria (UMA)

“A new whole genome vaccine against Malaria”

Research supervisors: Dr. Miguel Prudêncio, Dr. Maria M. Mota

2005 – 2009

***Postgraduate & field research assistant***

Imperial College, London, UK  
Organisation pour la lutte Contre les Endemies en Afrique Centrale (OCEAC), Yaounde, Cameroon  
European Molecular Biology Laboratory (EMBL), Heidelberg, Germany

“Functional genomics of *Anopheles gambiae* interactions with malaria parasites”

Research supervisors: Dr. Dina Vlachou, Dr. George K. Christophides  
BioMalPar PhD supervisors: Prof. Fotis C. Kafatos, Prof. Robert E. Sinden and Prof. Michael Lanzer  
University supervisor: Prof. Dr. Carmo-Fonseca

2003 – 2004

***Undergraduate research assistant***

Johns Hopkins University  
Bloomberg School of Public Health (JHSPH), Baltimore, Maryland, USA

“Transcriptome of *Anopheles gambiae* salivary glands”

Research supervisor: Dr. George Dimopoulos

## EDUCATION

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Jun 2006 – Dez 2010 <b>Doutoramento</b>	Faculdade de Medicina da Universidade de Lisboa <i>Area: Ciências Biomédicas; Speciality: Ciências Biopatológicas</i> <i>Grade: Distinction and Honours</i>	Lisbon, Portugal Portugal
Sep 2004 - Nov 2004 <b>Postgraduate diploma</b>	Instituto Superior de Ciências da Saúde - Sul <i>Area: Parasitology</i>	Monte da Caparica, Portugal
1998 - 2004 <b>Licenciatura</b>	Instituto Superior de Ciências da Saúde - Sul	Monte da Caparica, Portugal

## OTHER ACADEMIC TRAINING

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Dec 2012	Course “Flow Cytometry analysis” Instituto de Medicina Molecular, Lisbon, Portugal
April 2011	Course “Animal experimentation” Instituto de Medicina Molecular, Lisbon, Portugal
Sep 2006	Workshop “Bioinformatics applied to the study of malaria parasites” Università degli Studi di Roma – La Sapienza, Rome, Italy
Nov 2005	Course “Scientific Procedures on animals” Imperial College, London, UK;
Oct 2005	Workshop “Immunological techniques from the field to the bench” Armauer Hansen Research Institute (AHRI), Addis Ababa, Ethiopia
March 2005	BioMalPar PhD course, Universitat Heidelberg, Heidelberg, Germany

## HONOURS & AWARDS

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Jan 2012- Dec 2014 <b>Postdoctoral fellowship</b>	FCT Fundação para a Ciência e Tecnologia, Ministério da Educação e Ciência, Post doctoral fellowship) (SFRH/BPD/80693/2011)
Jan 2011- Dec 2011 <b>Postdoctoral fellowship</b>	Grand Challenges Explorations (Round 5 – Nov 2010) Create New Ways to Protect Against Infectious Disease (IMM/BPD/71-2010)
Jan 2005 - Dec 2008 <b>Ph.D fellowship</b>	BioMalPar FP6 European Network of Excellence Ph. D fellowship (LSHP-CT-2004-503578)

## PEER REVIEWED RESEARCH ARTICLES

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- May 2012  
**Joint authorship** Magnusson K.\*, Lycett G. \***Mendes AM.\***, (...) Crisanti A., Windbichler N. (2012)  
“Demasculinization of the *Anopheles gambiae* X chromosome”  
BMC Evolutionary Biology May 18; 12(1):69
- Dec 2011  
**Review** Prudêncio M., Mota MM., **Mendes AM.** (2011)  
“A toolbox to study liver stage malaria”  
Trends Parasitol. Dec;27(12):565-74. Epub 2011 Oct 17.
- Nov. 2011  
**Authorship** **Mendes AM.**, (...) Christophides GK., Morlais I., Vlachou D., (2011)  
“Infection intensity-dependent responses of *Anopheles gambiae* to the African malaria parasite *Plasmodium falciparum*.”  
Infect Immun. Nov;79(11):4708-15. Epub 2011 Aug 15.
- June 2011  
**Joint authorship** Magnusson K.\*, **Mendes AM.\***, (...), Christophides GK., Crisanti A. (2010)  
“Transcription regulation of sex-biased genes during ontogeny in the malaria vector *Anopheles gambiae*”  
PLoS ONE 6(6):e21572. doi:10.1371 / journal.pone.0021572
- October 2010  
Suchismita D., (...), **Mendes AM.**, Valenzuela JG, Dimopoulos G. (2010)  
“Transcriptomic and functional analysis of *Anopheles gambiae* salivary gland in relation to blood feeding”  
BMC Genomics Oct14;11:566
- May 2008  
**Joint authorship** **Mendes AM.\***, Schlegelmilch T.\*, (...) Kafatos FC, Vlachou D. et al, (2008)  
“Conserved Mosquito/Parasite interactions affect development of *Plasmodium falciparum* in Africa”  
PLoS Pathog 4(5): e1000069. doi:10.1371/journal.ppat.1000069
- May 2007  
Waterhouse, RM, (...), **Mendes AM.**, (...) Kafatos FC., Christophides GK. (2007)  
“Evolutionary dynamics of immune-related genes and pathways in disease vector mosquitoes.”  
Science 316(5832): 1738-43
- Aug 2006  
**Review** Vlachou, D., (...), **Mendes AM.**, Kafatos FC. et al (2006)  
“The developmental migration of *Plasmodium* in mosquitoes”  
Curr Opin Genet Dev 16(4): 384-91

## PATENTS

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- April 2012  
PCT/IB2013/053050  
Genetically modified rodent Plasmodium parasites as platforms for a whole-organism malaria vaccine.

## SELECTED CONFERENCE PRESENTATIONS

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April 2008 <b>Invited Speaker</b>	Fourth Annual BioMalPar conference on the Biology and Pathology of the Malaria Parasite, EMBL, Heidelberg, Germany “Genomic analysis of mosquito/parasite molecular interactions in natural and model laboratory transmission systems”
April 2007 <b>Poster presentation</b>	Third Annual BioMalPar conference on the Biology and Pathology of the Malaria Parasite, EMBL, Heidelberg, Germany “Genomic analysis of <i>Anopheles gambiae</i> responses to sympatric <i>Plasmodium falciparum</i> isolates in Cameroon”
December 2006 <b>Oral Presentation</b>	Annual BioMalPar Cluster 3 Meeting, University of Oxford, Uk “Functional genomic analysis of <i>Anopheles gambiae</i> responses to rodent and human malaria
September 2006 <b>Oral Presentation</b>	Workshop “Bioinformatics applied to the study of malaria parasites” Università degli Studi di Roma – La Sapienza, Rome, Italy “ <i>Anopheles</i> / <i>Plasmodium</i> interactions: From lab models to natural transmission systems”
August 2006 <b>Invited Speaker</b>	ICOPA XI International Congress of Parasitology of the World Federation of Parasitologists, Glasgow, UK “ <i>Anopheles</i> / <i>Plasmodium</i> interactions: From lab models to natural transmission systems”
April 2006 <b>Poster presentation</b>	Second Annual BioMalPar conference on the Biology and Pathology of the Malaria Parasite, EMBL, Heidelberg, Germany “Comparative genomic analysis of <i>Anopheles gambiae</i> responses to <i>Plasmodium</i> parasites”
December 2005 <b>Oral Presentation</b>	Annual BioMalPar Cluster 3 Meeting, Institute Pasteur, Paris, France “Functional genomics analysis of <i>Anopheles gambiae</i> responses to rodent and human malaria
October 2005 <b>Oral Presentation</b>	Workshop “Immunological techniques from the field to the bench” Armauer Hansen Research Institute (AHRI), Addis Ababa, Ethiopia “Genome wide expression profiling of <i>Anopheles gambiae</i> responses upon infection with <i>Plasmodium berghei</i> ”

## ADDITIONAL SKILLS AND INFORMATION

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Language skills: Portuguese (native speaker), English (excellent written & spoken), French (good written & spoken; *DELF A1 to A4: Diplome en Langue Francaise*, Alliance Francaise, Portugal )

Excellent computer skills: Windows XP, MS Office, Adobe Illustrator, Adobe Photoshop, Adobe Acrobat, GenePix, Genstat, GeneSpring and various other bioinformatics and statistical tools.